

Date: Wednesday, 07/05/2008 1:57:06 PM  
 User: Jean-Luc Menard

## Process Sheet

OK

Customer : CU-DAR001 Dart Helicopters Services Drawing Name : ADAPTER  
 Job Number : 39108  
 Estimate Number : 13305  
 P.O. Number :  
 This Issue : 07/05/2008 S.O. No. :  
 Prsht Rev. : NC  
 First Issue : 07/05/2008 Type : MACHINED PARTS  
 Previous Run :  
 Written By : JLM 08.05.07  
 Checked & Approved By :  
 Comment : Est Rev:A New Issue 08-05-07 JLM Verified By:DD

Part Number : D37731  
 Drawing Number : D3773 PROTO  
 Project Number : N/A  
 Drawing Revision : PROTO 08.04.23  
 Material :  
 Due Date : 14/05/2008 Qty: 8 Um: Each

5 okay  
 per J.L.

Additional Product

FOR ENGINEERING USE ONLY

PROTOTYPE

Job Number:



Seq. #: Machine Or Operation: Description:

1.0 M304B1500X1500 M304B1.5"X1.5"



Comment: Qty.: 0.2363 f(s)/Unit Total: 1.1813 f(s)

M304B1.5"X1.5"

BATCH: M107979

J.L. 08/05/14

5

~~1~~

2.0 BAND SAW BAND SAW



Comment: BAND SAW

Cut blank 2.700" long

J.L. 08/05/14

~~1~~

3.0 HAAS1 HAAS CNC VERTICAL MACHINING #1



Comment: HAAS CNC VERTICAL MACHINING #1 HAAS CNC VERTICAL MACHINING #1

1- Mill as per Folio FA740 Rev. AA & Dwg D3773 Rev. A

2-Deburr per dwg D3773

J.L. 08/05/14

4.0 QC2 INSPECT PARTS AS THEY COME OFF MACHINE



Comment: INSPECT PARTS AS THEY COME OFF MACHINE

JLM 08.05.14

5.0 QC8



Comment: SECOND CHECK

SECOND CHECK

**ENGINEERING**

**APPROVAL**

JLM 08.05.20

JLM 08.05.14

Date: Wednesday, 07/05/2008 1:57:06 PM  
User: Jean-Luc Menard

## Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: ADAPTER

Job Number: 39108

Part Number: D37731

Job Number:



Seq. #:

Machine Or Operation:

Description :

6.0

PACKAGING 1

PACKAGING RESOURCE #1



(5) 08.05.29

Comment: PACKAGING RESOURCE #1

Identify and Stock

Location: *W3*

*08.05.22* *08.05.22*

7.0

QC21

FINAL INSPECTION/W/O RELEASE



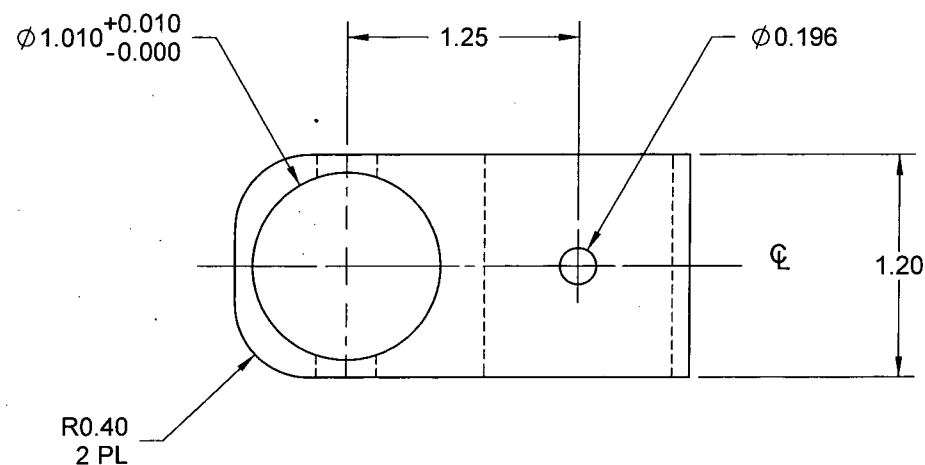
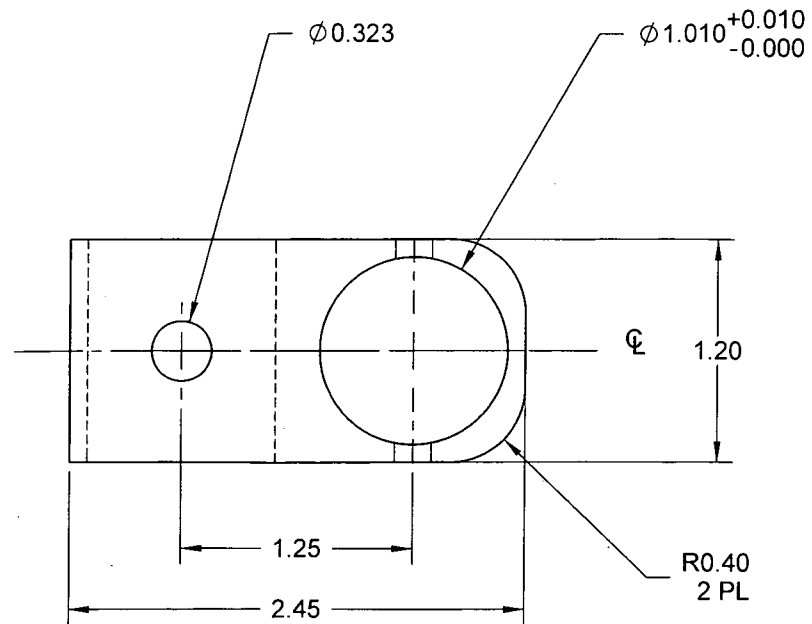
Comment: FINAL INSPECTION/W/O RELEASE

*08.05.29 Perry*  
*MF 08.05.22*

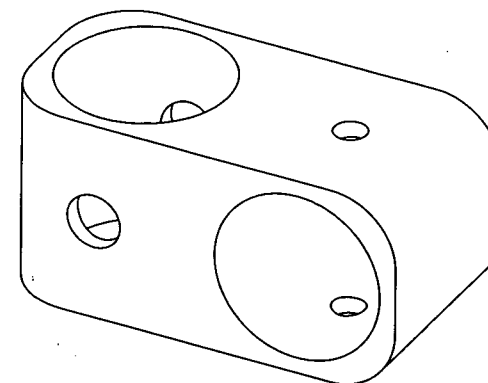
Job Completion



*00196A*



**D3773-1 ADAPTER**



*Order Mat.  
1.500" x 1.500"  
2.700  
La 740*

**PROTOTYPE**  
PLEASE RETURN ALL ISSUED  
DATA TO ENGINEERING

*08.04.23*

**NOTES:**

- 1) MATERIAL: AISI 304/316 SS BAR (REF DART SPEC M304B1.20X1.20)
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: N/A
- 7) WEIGHT: 0.40 lbs

*overhang  
1.750*

DESIGN	HS	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
DRAWN	HS		
CHECKED		DRAWING NO.	REV. A
MFG. APPR.		<b>D3773</b>	SHEET 2 OF 3
APPROVED		TITLE	SCALE
DE APPR.		<b>HEADREST ADAPTER</b>	1:1
DATE	<b>08.03.26</b>	<small>COPYRIGHT © 2008 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.</small>	

DART AEROSPACE LTD		Work Order:	39108
Description: adapter		Part Number:	D3773-1
Inspection Dwg: D3773	Rev: A	Page 1 of 1	

## FIRST ARTICLE INSPECTION CHECKLIST

<input checked="" type="checkbox"/> First Article	<input type="checkbox"/> Prototype
<p>1. <b>Introduction</b></p> <p>2. <b>Materials and Methods</b></p> <p>3. <b>Results</b></p> <p>4. <b>Discussion</b></p> <p>5. <b>Conclusion</b></p>	<p>1. <b>Introduction</b></p> <p>2. <b>Materials and Methods</b></p> <p>3. <b>Results</b></p> <p>4. <b>Discussion</b></p> <p>5. <b>Conclusion</b></p>

[illegible]

Measured by: J.L	Audited by: [Signature]	Prototype Approval: [Signature]
Date: 08/05/14	Date: 08/05/14	Date: 08.05.20

Rev	Date	Change	Revised by	Approved
A		New Issue	KJ/JLM	

## Receiving Report

Date: 8/27/9

Batch No: 19/01711

Supplier: MAGNA

Dart P/O: 6278

Packing Slip:	Yes	<u>✓</u>	No	<u>      </u>
Invoice:	Yes	<u>      </u>	No	<u>✓</u>
Receipt:	Cash	<u>      </u>	Cr	<u>✓</u>

Release Note Attached: Yes ☒ No ☐ N/A ☐  
Waybill Attached: Yes ☐ No ☒  
Shipment Complete: Yes ☒ No ☐ N/A ☐  
QC6 Inspection: 8/6/07 N/A ☐  
Work Order: \_\_\_\_\_ N/A ☒

## Discrepancies

Part Number	Description	Quantity Ordered	Quantity Received	Quantity Returned	Quantity Short	Comments
M 304 B1500 X 1500		12	12.8	0	0.8	
M 304 B0625 X 3000		12	13.2	0	1.2	

Initials of receiver (if shipment OK) Level 12                     

Production/Admin: 08/05/09  
Date 08/05/09  
Received/Costing RCP 7837  
Initial CL

Location \_\_\_\_\_

H:\FORMS\Purchasing\approved purch\RECREPORT Rev D

Sub-Total  
G.S.T.

815.00  
40.75

**TOTAL ➡**

855.75

PAIS D'ADMINISTRATION DE 1½% PAR MOIS (18% PAR ANNÉE) SUR COMPTE PASSÉ DÙ.  
 : PRÉSENT CONTRAT SERA RÉGI PAR LES LOIS DE LA PROVINCE DE QUÉBEC ET COMME  
 : ANT PRIS NAISSANCE DANS LE DISTRICT JUDICIAIRE DE MONTRÉAL.  
 ADMINISTRATION CHARGES OF 1½% PER MONTH (18% PER YEAR) ON OVERDUE ACCOUNTS.  
 : THE PRESENT AGREEMENT SHOULD BE GOVERNED BY THE QUEBEC LEGISLATION AND SHOULD  
 : BE CONSIDERED AS HAVING ORIGINATED IN THE JUDICIAL DISTRICT OF MONTREAL.

<b>BÖLLINGHAUS</b> <b>STEEL</b>	Abnahmeprüfzeugnis/Mill Test Certificate/Certif. de Qualidade EN 10204:2004 / 3.1		No.: / Nr.: / Nr.: 000005602				
	Unsere innere Verweisung / Our Int. Ref/ N/ ref int 5600008179 000160		Datum / Date / Data 04.03.2008				
Böllinghaus Portugal Aços Especiais, SA DIN EN ISO 9001:2000 TÜV CERT No. 01 100 030458							
<b>Normen / Standards / Normas</b> AISI 304/ 304L, ASTM A484/A484M-06-b, specifications acc. to: ASTM A276-06, ASTM A479/A479M-06-a, SA479-E01							
<b>Kunde / Customer / Cliente</b> ASA Alloys Inc 81 Steinway Blvd M9W 6H6 Etobicoke ON		<b>Endegültiger Kunde / Final Customer / Cliente Final</b> ASA Alloys Inc 81 Steinway Blvd M9W 6H6 Etobicoke ON					
Bestell Nr./Order Nr./ Enc.Nr. 068269-CV		Bestell Nr./ Order Nr./ Enc.Nr. 068269-CV.05					
<b>Prufgegenstand / Product / Produto</b> AISI 304/ 304L SQ 1 1/2"		<b>Gewicht / Weight / Peso</b> 4,396 lb		<b>Bunde / Bundle / Atados</b> 02			
Werkstoff-Nr. Material-no. 1.4307 Qualidade		Werkstoff-Normbezeichnung / Material standard grade / Norma do material X 2 CrNi 18-9					
<b>Beschreibung / Description / Descrição</b> Stainless steelsquare bars, hot rolled, heat treated, straightened, pickled. US DFAR 252.225-7014: MELT SOURCE: United Kingdom / MFG: Portugal.							
<b>Schmelzen Nr. / Cast nr. / Fusão nr.</b>							
<b>Chemische Analyse in % / Chemical composition in % / Analise quimica em %</b>							
138224	C: 0.021	Si: 0.370	Mn: 1.930	P: 0.037	S: 0.028	Cr: 18.200	Ni: 8.130
EAF	Mo: 0.500	Co: 0.060	Cu: 0.310	N: 0.098	Ti: 0.005	W: -	V: -
Proben Nr. Test no. Amostra no.	<b>ASTM E399</b> Kerbschlagarbeit Impact Test Resiliência {Charpy V}		Streckgrenze Yield point Tensão limite Rp 0.2 %	Dehngrenze 1% point Limite de extensão Rp 1,0%	Zugfestigkeit Tensile strength Tensão de rotura Rm	Dehnung Elongation Alongamento A {A50-50mm}	Einschnürung Reduction of area Coef. Estrrição. Z {A50-50mm}
	[ J ]		[ Ksi ]	[ Ksi ]	[ Ksi ]	[ % ]	[ % ]
3013323.01.01	-		50.0	56.6	93.1	50.5	70.3
3013323.01.02	-		49.6	56.0	92.8	50.9	70.6
3013323.01.03	-		48.9	55.3	92.2	51.3	71.0
3013323.01.04	-		48.2	54.7	91.8	51.8	71.4
Visuelle Kontrolle Visual inspection Inspeção visual	<input checked="" type="checkbox"/> Ok	<b>ASTM E370</b> Härte Hardness Dureza 190 [ HB ]		<b>ASTM A262-93a Practice E</b> Korrosionsbeständigkeit IC Test Corrosão Inter cristalina		Wärmebehandlung Heat treatment Tratamento térmico	
<b>ASTM A484</b> Maßkontrolle Dimensional inspection Inspeção dimensional	<input checked="" type="checkbox"/> Ok	<b>E 112-96e1</b> Korngröße Grain size Tamanho de grão 6		Werksachverständiger Quality Control Representative Inspector da Qualidade		Annealed Quenched 1050 °C	
Verwechslungsprüfung Test of identity Teste de identificação	<input checked="" type="checkbox"/> Ok	Makroskopische Untersuchung Macrographic test Material free from segregation defects.		<input checked="" type="checkbox"/> Ok			
<b>Bemerkungen / Remarks / Observações</b> Micrographic test: approved. Material is free of mercury contamination, no weld repair done.				<b>Böllinghaus Portugal - Aços Especiais, SA</b> Es wird bestätigt, dass dieses Material die Spezifikation zutrifft, welche de erwähnten Standards übereinstimmen. We confirm that this material meets the specification according the mentioned according the mentioned standards. Confirmamos que este material respeita as especificações de acordo com as normas referidas.			